

Amendment to the Claims

The following listing of claims shall replace all prior listings, and versions, of claims in this application.

1. (Currently amended) A method for determining the antithrombin III (AT) content in a sample that may contain one or more pharmaceutical compounds that inhibit thrombin, the method comprising:
  - (a) providing a reaction mixture by contacting the sample with a first reagent R1 comprising thrombin, under conditions wherein the thrombin essentially does not interact with AT but interacts with the one or more pharmaceutical compounds that inhibit thrombin, if present,
  - (b) adding to the reaction mixture a second reagent R2 comprising a chromogenic substrate which is a peptide substrate for thrombin, and determining the amount of free fraction of thrombin not interacting with AT,
  - (c) changing the conditions of the reaction mixture by adding to the reaction mixture a third reagent R3 comprising heparin such that thrombin interacts with AT,
  - (d) conducting a second determination of the amount of the free fraction of thrombin not interacting with AT in the reaction mixture, wherein the determination comprises using the reagent R2,
  - (e) determining the difference between the first and second determinations of thrombin not interacting with AT, and
  - (f) determining the AT content of said sample from said difference determined in step (e).
2. (Cancelled)
3. (Cancelled)
4. (Cancelled)
5. (Withdrawn) The method of claim 1 wherein the second reagent R2 comprises an antibody for determining the free AT binding partner.

6. (Cancelled)
7. (Cancelled)
8. (Previously Presented) The method of claim 1 wherein the first reagent R1 further comprises an antagonist for heparin.
9. (Previously presented) The method of claim 8 wherein the first reagent R1 comprises hexadimethrine bromide.
10. (Previously presented) The method of claim 1 wherein the third reagent R3 further comprises additional thrombin.
11. (Previously Presented) The method of claim 1 wherein said first and/or second determination of thrombin comprises a kinetic determination.

Claims 12-15 (Cancelled)

16. (New) The method of claim 1, wherein the sample contains one or more pharmaceutical compounds that inhibit thrombin.
17. (New) A method for determining the amount of antithrombin III (AT) in a sample containing one or more pharmaceutical compounds that inhibit thrombin, the method comprising:
  - (a) providing a reaction mixture by mixing the sample with thrombin and an antagonist for heparin under conditions wherein the thrombin essentially does not interact with AT but interacts with the one or more pharmaceutical compounds that inhibit thrombin, if present,
  - (b) adding to the reaction mixture a chromogenic substrate which is a peptide substrate for thrombin, and conducting a first determination of the amount of a free fraction of thrombin,
  - (c) changing the conditions of the reaction mixture by adding heparin to the reaction mixture such that thrombin interacts with AT,

- (d) conducting a second determination for the free fraction of thrombin in the reaction mixture using the chromogenic substrate,
- (e) determining the difference between the first and second determinations of thrombin, and
- (f) determining the AT content of said sample from said difference determined in step (e).

18. (New) The method of claim 17 wherein the first reagent R1 comprises hexadimethrine bromide.

19. (New) The method of claim 17 wherein the third reagent R3 further comprises additional thrombin.

20. (New) The method of claim 17 wherein said first and/or second determination of thrombin comprises a kinetic determination.